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Sir,

Incidence of post-operative endophthalmitis following 23-gauge transconjunctival sutureless vitrectomy in the United Kingdom: a survey

We carried out a confidential and anonymous 19-question online survey aimed at members registered on the Britain & Eire Association of Vitreoretinal Surgeons (BEAVRS) online forums, looking at rates of post-operative endophthalmitis following 23-gauge (23G) trans-conjunctival sutureless vitrectomy (TSV). Participants were asked to state the total number of 23G TSV cases performed in their career, and the number of cases of post-operative endophthalmitis that occurred from these. Endophthalmitis was not defined. Participants were asked to check surgical logbooks for accuracy before quoting case and complication numbers.

In all, 45/144 members registered on the BEAVRS online forums in April 2009 participated, giving a 31% response rate. Of the participants, 36% preferred 23G. Of these, the most popular port system was Alcon-based for 39, 52% had performed a two-step port entry technique, and 87% had performed a conjunctival sac wash with 5% povidone–iodine. In addition, 26% routinely used fluid–air exchange to prevent hypotony even when there was no other clinical indication for endotamponade, and 87% gave antibiotics sub-conjunctivally. A total of 4944 23G TSV cases were estimated to have been performed by 23 surgeons. Two cases of post-operative infective endophthalmitis were reported, giving an overall incidence rate of 1 in 2472 (0.040%).

This survey had a low response rate. This is likely due to the fact that the BEAVRS forums are open to membership from ophthalmic trainees and VR surgeons outside the United Kingdom (who were not eligible to participate), that not all UK VR surgeons practice 23G TSV (and therefore may have decided not to participate in the survey), and that some surgeons do not like discussing operative complication rates. Without documentary evidence, the numbers of cases performed as quoted by participants can only be taken as estimates.

Internationally published rates for 20G vitrectomy range from 0.018%[1] to 0.07%.[2] The only UK evidence quotes 0.038%.[3] Therefore, the estimated rate of post-operative endophthalmitis of 0.040% for UK-based 23G TSV is acceptable when compared with these numbers. Obtaining a more accurate rate would require a prospective national audit with an open reporting system for complications.

Conflict of interest

The authors declare no conflict of interest.

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KC Patel[1] and R Rahman[2]

[1]Hull Royal Infirmary, Hull, UK
[2]Calderdale Royal Hospital, Halifax, UK
E-mail: karnesh@doctors.org.uk or binarahman@fsmail.net

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Sir,

Diagnosis of fungal keratitis by *in vivo* confocal microscopy: a case report

Fungal keratitis (FK) is a severe blinding eye disease and a major cause of ocular morbidity.[1] The clinical features of FK are not specific and the diagnosis is frequently not suspected until an aggressive treatment for bacterial, viral, or amebic keratitis has failed.

Case report

We report a case of a 65-year-old woman who developed a severe infectious keratitis in her left eye after a corneal injury caused by a tree branch and was initially treated by her family doctor with a local combination of tobramycin and dexamethasone. After 4 days she presented to an ophthalmology department for decreased vision and increased pain in her left eye. On initial evaluation, best-corrected visual acuity was hand movement in her left eye. Clinical examination revealed numerous purulent secretions, a conjunctival hyperaemia, and a large irregular whitish central corneal infiltrate (4.5 mm × 5 mm) with 1 mm hypopyon. The left eye fundus could not be visualized. Examination of her right eye was normal. Corneal scrapings were analysed by direct examination and culture. She was started on hourly topical fortified tobramycin, gentamicin and vancomycin, and oral levofloxacin. After 3 days, presence of *Pseudomonas aeruginosa* was identified, vancomycin and tobramycin were stopped, and topical fortified ceftazidime was added according to bacterial sensitivity. However, after 5 days of this treatment the corneal infiltrate increased in size and depth, and the hypopyon increased to 2 mm (Figure 1a). The patient was referred to our department for an *in vivo* confocal microscopy (IVCM) examination.

Interestingly, IVCM images (Heidelberg Retina Tomograph 3—Rostock Cornea Module, Heidelberg Engineering, Heidelberg, Germany) of the left eye